

REMARKS

Claim Amendments

Claim 1 has been amended. Support for these amendments can be found in prior claims 2 and 6, and throughout the specification and drawings, *see, e.g.*, Figs. 1-7 and related text. No new matter is added, and the amended claims continue to read on the elected invention/species.

Claim Rejections

Claims 1, 2-8, 11, 21, 26, 36-37, 40-41, 62, 66-70, 73-74 stand rejected under §102 over U.S. Patent No. 5,496,318 ("Howland"). In addition, claims 2, 71-72 stand rejected under §103 over Howland in view of U.S. Patent No. 6,190,387 ("Zucherman"). For all rejections, Howland is the primary reference.

As amended, independent claim 1 requires, *inter alia*, that the "spacer is rotatable about said longitudinal axis so as to be variably positioned rotationally relative to said first wing while said spacer is coupled to said first wing." In the rejection, the Examiner identifies 16 as the first wing, but is unclear as to what the spacer is. The Action states that "10" is the spacer; however, this clearly cannot be because 10 includes the first wing, and the putative second wing 20 (which is required to be removably mounted), and indeed everything of the Howland device. Applicant therefore assumes that the Examiner meant to identify element 14 as the putative spacer.¹ Under this interpretation, the Howland device plainly does not meet the limitation that the

¹ If the rejection of claim 1 is maintained over Howland, Applicant requests pursuant to MPEP §706.07 that the Examiner clarify exactly which elements of Howland Fig. 1-3 form the alleged spacer, and

spacer be "rotatable ...so as to be variably positioned relative to said first wing." Fig. 3 of Howland shows the "plate 14" and the "bar 16" as a single solid unit. There is no indication anywhere in Howland that the bar 16 is ever relatively rotatable with the plate 14. Instead, the Howland "wing" 16 is securely fixed relative to the "spacer" 14. Thus, rotation of the spacer necessarily results in identical rotation of the "wing" 16. In other words, even assuming *arguendo* that these parts may rotate together, they simply cannot be rotated relative to each other.² As such, Howland cannot meet the limitation that that the "spacer is rotatable about said longitudinal axis so as to be variably positioned rotationally relative to said first wing while said spacer is coupled to said first wing." And, the Examiner has not identified anything in Zucherman that cures this defect. Accordingly, independent claim 1, and its dependent claims define over the cited art, alone in or combination.

With further regard to dependent claim 8, this claim requires that "the spacer can rotate relative to the wing and the distraction guide." As with "wing" 16, the putative distraction guide 15 is fixed relative to the "spacer" 14. Indeed, 15 appears to be merely the fixed tip of element 14. There is no indication anywhere in Howland that tip 15 is rotatable relative to the rest of element 14. As such, Howland simply cannot meet the requirement that the spacer "can rotate relative to the wing and the distraction guide." And, the Examiner has not identified anything in Zucherman that cures this defect. Accordingly, dependent claim 8 defines over the cited art, alone in or combination.

particularly clarify which of the elements 14, 15, 20, 16, and 22 are deemed to be the "spacer." The Examiner is further requested to illustrate the alleged position of the claimed "longitudinal axis."

² Moreover, even if the entire Howland device 10 is considered the claimed "spacer" as somewhat suggested by the Action, this "spacer" cannot rotate relative to the first wing because this would require the device to *rotate relative to itself*, which is impossible.

With further regard to dependent claim 7, this claim requires "wherein, in cross-sectional view of said spacer normal to said longitudinal axis, a largest height of said posterior edge of said spacer taken perpendicular to a theoretical line extending between said anterior and posterior edges is greater than a corresponding largest height of said anterior edge of said spacer." The Examiner asserts Howland meets these limitations, but fails to identify how Howland allegedly does this. Applicant therefore requests, pursuant to MPEP §706.07 that the Examiner provide an annotated illustration from Howland that shows the claimed longitudinal axis, the anterior edge, the posterior edge, and where the claimed height is measured. Applicant requests this because Applicant understands that the longitudinal axis runs horizontally in Fig. 2 (through the center of element 14), and that the anterior edge of the Howland device is "in" the paper while the posterior edge is the outer edge facing the viewer. With this orientation, the anterior edge of spacer 14 appears to be of identical height as the posterior edge. Thus, absent such illustration, Applicant and the record are left unclear as to how the Examiner is interpreting Howland to allegedly meet the claim limitations of claim 7.

With further regard to dependent claim 71, this claim requires that the "second wing has a rounded anterior edge and a rounded posterior edge and is elongated therebetween in said first direction; said second wing further having generally linear surfaces disposed between said second wing anterior and posterior edges disposed so as to diverge from each other toward said second wing posterior edge." There is no indication that Howland's second wing 20 has such a configuration. As such, the Examiner looks to Zucherman. The Examiner states that the Zucherman spacer has

"rounded anterior and posterior edges." Assuming *arguendo* that this is true, such does not necessarily show "generally linear surfaces disposed between said second wing anterior and posterior edges disposed so as to diverge from each other toward said second wing posterior edge," as claimed. Indeed, the rejection does not mention divergence at all. As such, Applicant submits that dependent claims 71-72 define patentable subject matter over the cited art for this additional reason.

Independent method claim 36 requires, *inter alia*, that "wherein, after said fastening [the second portion to the first portion], said first wing, said second wing, and said spacer are elongated in a posterior to anterior direction with respect to the adjacent spinous processes." The Examiner asserts that insertion of the Howland device would inherently carry out the method steps. Applicant respectfully disagrees. With reference to Howland Fig. 2, the anterior edge of the Howland device is the hidden edge "in" the paper while the posterior edge is the outer edge facing the viewer. It is plain by looking at Figs. 2-3 of Howland that any elongation of the "wing" 16 is in the vertical direction in Fig. 2, not into/out of the plane of the paper. Thus, the Howland "wing" 16 is not elongated "in a posterior to anterior direction," as claimed. Similar logic applies to the spacer 14 and the second wing 20. And, the Examiner has not identified anything in Zucherman that cures these defects. Accordingly, independent claim 36, and its dependent claims define over the cited art, alone in or combination.

With further regard to dependent claim 41, this claim requires "implanting the implant without altering the spinous processes." Applicant directs the Examiner's attention to col. 3, lines 33-49, where Howland specifically describes cutting square

notches in the spinous processes as part of the Howland installation. Cutting square notches in the spinous processes is plainly altering the spinous processes. As such, Applicant submits that Howland teaches altering the spinous processes, not "without altering the spinous processes," as claimed.

With further regard to dependent claim 66, this claim requires "inserting said first portion of the implant between adjacent spinous processes of cervical vertebrae." Howland describes a device for use in the lumbar region of the spine, not the cervical region. Indeed, the rejection does not even mention "cervical" anywhere. As such, Applicant submits that Howland does not teach "inserting said first portion of the implant between adjacent spinous processes of cervical vertebrae," as claimed.

With further regard to dependent claim 70, this claim requires "rotating said spacer relative to said first wing." As pointed out above with respect to independent claim 1, Howland's "wing" 16 is not relatively rotatable with respect to the "spacer" 14. As such, Howland simply cannot teach this limitation. And, the Examiner has not identified anything in Zucherman that cures this defect. Accordingly, dependent claim 70 defines over the cited art, alone in or combination, for this additional reason.

In view of the above amendments and remarks, the Applicant submits that the present application is in condition for allowance and such action is respectfully requested. If any issues remain unresolved, the undersigned requests a telephone interview to expedite allowance and issuance.

Respectfully submitted,
COATS & BENNETT, P.L.L.C.



Dated: October 21, 2008

John R. Owen
Registration No.: 42,055
Telephone: (919) 854-1844
Facsimile: (919) 854-2084